Standard: CS.T.01   Grade: 2

Standard 2.CS.T.01
Identify and summarize basic **troubleshooting** techniques to solve basic **hardware** and **software** problems (e.g., turning off and on a device to restart, closing and reopening an **application**/**program**, turning on speakers).

Essential Skills
Identify possible strategies to resolve an issue with a **computing device** or program.
Implement the strategies identified and determine if the issue has been resolved.

Essential Questions
Why do you need to use the right words when describing a computer problem?
What steps can you take to fix a problem with a **computing device?**

Explanation
Problems with **computing systems** have different causes. Students at this level do not need to understand those causes, but they should be able to communicate a problem with accurate terminology (e.g., when an **application** or **program** is not working as expected, a device will not turn on, the sound does not work, etc.) and use simple **troubleshooting** strategies to attempt to remedy it. **Rebooting** a device (powering off and on again) is often one of the first things students should try.

Think of this as similar to….
If you are walking and your foot begins to hurt, first you check to see if you have a rock in your shoe, then you check to see if your sock is bunched up, finally you check to see if you have a cut on your foot.

Implementation Examples—What would this look like in the classroom?

Title	Description	Link	Content Connection & Notes
Troubleshooting	**Grade K**--Troubleshooting can be included organically when using any device. When a problem arises, help students articulate what the issue is (for example: they can't hear, nothing is on the screen) **Grade 1**--Students should begin to pinpoint issues they are having--if they can't hear they can check the headphones, the volume, etc. **Grade 2**--Students attempt to resolve issues with their devices independently. They should use accurate vocabulary to describe what is wrong and how they attempt to fix it (for example: There is no sound coming from the headphones, so I checked the volume which was fine; I then tried a different set of headphones and those worked.)		

Standard: CS.T.01 Grade: 2

These annotations are a collaboration between Maryland Center for Computing Education and the Maryland State Department of Education.